

SPECIFICATION AMENDMENTS

Page 11, line 25 through page 12, line 5, replace the paragraph with the following amended paragraph:

The output 17 of the voltage source 15 is connected both to a first terminal for a sensor resistor R_{sens} and to a voltage divider on the input side. The voltage divider comprises a resistor 7a and 7b. A capacitor C1 is connected parallel to the resistor 7b. The first output 12 is connected to the connecting line between the resistor R7a and the resistor R7b.

The capacitor C1 brings about voltage stabilization at the first output 12. A second terminal 19 for the sensor resistor R_{sens} is connected to a reference resistor R_{ref} , which is also connected to ground GND. The reference resistor R_{ref} is preferably a so-called shunt resistor. Such shunt resistors have relatively low ohmic values of $4\text{-}m\Omega$ 0.001 Ω up to around 100Ω and a high current carrying capacity of 1 mA up to 100 A.

Page 14, lines 17-20, replace the paragraph with the following amended paragraph:

A second low-pass 16 ~~smoothes~~ smooths the base voltage of the third transistor Q3, thereby reducing the alternating component of the output voltage, which is present at the output 17 of the voltage source 15.